

AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior listings of the claims in this application:

LISTING OF THE CLAIMS

1. (Previously presented) A method of treating a patient suffering from a brain or spinal cord injury or neurodegenerative disease, the method comprising administering cultured bone marrow stromal cells into a central nervous tissue adjacent to an impaired nervous tissue of the patient in order to activate endogenous stem cells in the brain to differentiate into parenchymal cells.
2. (Original) A method of activating the differentiation of neural cells in an injured brain or spinal cord comprising the steps of: transplanting bone marrow cells adjacent to the injured brain cells; and activating the endogenous central nervous system stem cells to differentiate into neurons.
3. (Currently amended) A method of treating injured brain or spinal cord cells comprising the steps of: transplanting cultured bone marrow cells near the injured brain cells; and generating new neurons at the location of transplantation or of intravascular (~~intraarterial, intravenous~~) injection of cultured bone marrow cells.
4. (Previously presented) A method of treating injured brain or spinal cord in a patient by injecting or transplanting a composite of mesenchymal stem cells (MSCs) and neurospheres into a central nervous tissue adjacent to an impaired nervous tissue of the patient in order to activate endogenous stem cells in the brain to differentiate into parenchymal cells.
5. (Previously presented) The method of claim 1, wherein the central nervous tissue adjacent to the impaired nervous tissue comprises a penumbral tissue.

6. (Previously presented) The method of claim 1, wherein the central nervous tissue adjacent to the impaired nervous tissue comprises an ischemic boundary zone.

7. (Previously presented) The method of claim 1, wherein the cells are administered to the central nervous tissue adjacent to an impaired nervous tissue by way of intravascular administration.

8. (Previously presented) The method of claim 1, wherein the cells are administered to the central nervous tissue adjacent to an impaired nervous tissue by way of direct transplantation.

9. (Previously presented) The method of claim 1, wherein the impaired nervous tissue comprises a brain tissue.

10. (Previously presented) The method of claim 1, wherein the impaired nervous tissue comprises a spinal cord tissue.

11. (Previously presented) The method of claim 1, wherein the impaired nervous tissue comprises a lesion and further wherein the cells are administered into a penumbral tissue adjacent to the lesion.

12. (Previously presented) The method of claim 1, wherein the impaired nervous tissue comprises a lesion and further wherein the cells are administered into an ischemic boundary zone adjacent to the lesion.

13. (Previously presented) The method of claim 1, wherein the impaired nervous tissue comprises a tissue affected by stroke.

14. (Previously presented) The method of claim 1, wherein the neurodegenerative disease is Parkinson's disease.

15. (New) The method of claim 3, wherein the location of intravascular injection is intraarterial.

16. (New) The method of claim 3, wherein the location of intravascular injection is intravenous.